

## MODIS IOT Weekly Report

Mission Operations Days: 2000/246 to 2000/252

September 1, 2000 20:00:00 GMT to September 8, 2000 20:00:00 GMT

### Terra Spacecraft and MODIS Instrument Status:

Terra (AM-1) is in Normal Mode

MODIS is in Science Mode

Blackbody	A On; B Off	Nominal
Calibration Electronics	A On; B Off	Nominal
Control Processor	A On; B Off	Nominal
Door: Nadir	Unlatched, open	Nominal
Space View	Unlatched, open	Nominal
Solar Diffuser	Unlatched, closed	Nominal
FDDI Formatter	A On; B off	Nominal
FIFO Memory	1 & 2 On; 3 & 4 Off	Nominal
Format Processor	A On; B off	Nominal
PC FPA	A On	Nominal
Power Supply:1	On	Nominal
2	Off	Nominal
PV FPAs: VIS	A On	Nominal
NIR	A On	Nominal
SMIR	A On	Nominal
LWIR	A On	Nominal
Radiative Cooler:		
Outgas Heaters	Off	Nominal
LWIR FPA Heater	On	Nominal
SMIR FPA Heater	Off	Nominal
Scan Assembly	A On; B off	Nominal
SDSM	Off	Nominal
SRCA	Off	Nominal
Survival Heaters: PS1	Enabled	Nominal
PS2	Enabled	Nominal
Timing Generator	A On; B Off	Nominal
Flight Software	Rev BD + 2 patches	Nominal
Inhibit Ids Set	None	Nominal
TMONs enabled	66,67, 68	Nominal

### This Week's Completed MODIS Activities:

Saturday, September 2, 2000

None

Sunday, September 3, 2000

None

Monday, September 4, 2000

None

Tuesday, September 5, 2000

None

Wednesday, September 6, 2000

None

Thursday, September 7, 2000

251/20:55:18 ATC OA15 - SDSM Open

251/22:34:11 ATC OA16 - SDSM Screened

Friday, September 8, 2000

252/13:37 Real-Time SMIR VDET/ITWK to 79/110

252/13:42:49 ATC SRCA 10W Spatial:  
using Spectral Slit with EA sector rotation and delay stepping  
(activity MOD\_OA25\_10W\_SPAT\_SLT\_SECT\_A)

252/15:21:42 ATC SRCA 1W Spatial:  
using Along Scan Reticle with EA sector rotation and delay  
stepping

(activity MOD\_OA25\_SRCA\_1W\_SPAT\_SECT\_A)  
252/16:12 Real-Time SMIR VDET/ITWK to 110/226 (Nominal Operations)

This Week's Scheduled MODIS Activities Not Completed:

None

Upcoming MODIS Events:

Saturday, September 9, 2000

None

Sunday, September 10, 2000

None

Monday, September 11, 2000

None

Tuesday, September 12, 2000

256/13:53 Real-Time SMIR VDET/ITWK to 79/110

256/14:38:44 ATC OA16 - SDSM Double Screened

256/16:17:38 ATC OA15 - SDSM Double Open  
256/16:25 Real-Time SMIR VDET/ITWK to 110/226 (Nominal Operations)

The two day passes for the SD/SDSM activities fall across the central and western Atlantic. This should keep us clear of Africa, Hawaii and Alaska for Day and Night Ground Tracks for both the activities and the off-nominal VDET/ITWK values.

256/18:12 Real-Time Set new Gain Values for Band 14H (1-10), and Band 25 (1).

Wednesday, September 13, 2000  
None

Thursday, September 14, 2000  
None

Friday, September 15, 2000  
None

#### Maneuvers:

The next roll maneuver to view the moon through the space view port is scheduled for September 18<sup>th</sup> (2000-262, 05:29:56 - 05:16:44 GMT).

#### MODIS Anomalies:

The formatter anomaly investigation has continued. At approximately 8:00pm EDT August 19<sup>th</sup>, the formatter errors ceased occurring. There are currently 9 unique error addresses recorded by the Formatter, and a total error count of 2183. The A-Side Formatter is operating at approx. - 0.3C.

The LWIR CFPA temperature control has been restored. The temperature is holding within +/- 0.02K of the set-point of 83K. The LWIR CFPA heater voltage is cycling with orbital variations of +/- 0.5V around 6.0V.

MCST is establishing automatic long term trending and critical telemetry point monitoring to track the lasting results of the two recent anomaly resolutions.

#### General Instrument Comments:

MODIS is in Science Mode on the A-side with the SVD and NAD open, operating with the Formatter Resolution Flight Software Patches.

MODIS Telemetry Trends:

See MODIS Anomalies above.

Non-MODIS Significant Events:

None

Limited Life Item Status:

SRCA 10W Lamp #1: 173.5 of 500 hours

SRCA 10W Lamp #2: 135.9 of 500 hours

SRCA 10W Lamp #3: 145.1 of 500 hours

SRCA 10W Lamp #4: 61.5 of 500 hours

SRCA 1W Lamp #1: 556.1 of 4000 hours

SRCA 1W Lamp #2: 276.3 of 4000 hours

Solar Diffuser Door: 1405 of 3022 Movements

Nadir Aperture Door: 532 of 1316 Movements

Space View Door: 437 of 1316 Movements